1	JUDGE SIPPEL: Then you're finished as far as this
2	witness is concerned, right?
3	MR. STENGER: No
4	JUDGE SIPPEL: I know you're going to have cross
5	examining.
6	MR. STENGER: Yes, that's what I'm talking about. Yes.
7	I'm waiting to cross examine.
8	JUDGE SIPPEL: The housekeeping rules are straightened
9	out? That's all I'm asking. You may proceed.
10	MR. ENGEL: Permission to approach the witness?
11	JUDGE SIPPEL: You may, sir.
12	WHEREUPON,
13	LEE PILLAR
14	was called as a witness by Counsel for the Bureau and, having been
15	first duly sworn, assumed the witness stand, was examined and
16	testified as follows:
17	DIRECT EXAMINATION
18	BY MR. ENGEL:
19	Q Good morning, sir. Please, again, state your name for
20	the record.
21	A Lee Pillar.
22	Q And, before you, you have EB Exhibit 1E, 1 Echo, is that
23	correct?
24	A Yes.
25	Q And is that, in fact, your direct testimony in this case?

1	A	Yes.
2	Q	Would you please turn to the last page and verify whether
3	that's	your signature?
4	A	Yes.
5	Q	And, for the Court, would you briefly describe your
6	educat:	ional background and professional work background, as it
7	relate	s to your testimony?
8	A	I've been doing electronics for 32 years. I have a
9	degree	in avionics, which is electronics of an aircraft. I was
10	employe	ed by USAir for 20-some years, or no, 18 years. And then I
11	worked	on Express Carriers for a couple years before that.
12		MR. ENGEL: Your Honor, I
13		THE WITNESS: And I'm sorry. Duquesne Light, too.
14	-	MR. ENGEL: Thank you.
15	BY MR.	ENGEL:
16	Q	And when did you deal with Duquesne Light?
17	A	2005 I was hired at Duquesne Light.
18		MR. ENGEL: Your Honor, I'd like permission to ask a
19	potent:	ially leading question about Duquesne's for the witness to
20	expand	on Duquesne's need for the spectrum at issue in this case.
21		JUDGE SIPPEL: Yes, you may do that. For preliminary
22	matter	s such as this and background, leading questions are
23	approp:	riate.
24		MR. ENGEL: Thank you, Your Honor.
25	BY MR.	ENGEL:

1	Q Mr. Pillar, I'd direct your attention to Paragraph 3,
2	and, actually, the second page of your testimony where Paragraph
3	is. You state in that paragraph that Duquesne has a need for the
4	spectrum in or near the 220 megahertz band, is that correct?
5	A Yes, sir.
6	Q And why does Duquesne have such a need for that spectrum?
7	A The terrain in the region where we live, Duquesne's
8	territory, is a lot of hills, valleys, riverbeds. It's RF physics
9	to lower the frequency. It'll sink down to the valleys. It'll
10	reach out and touch a lot more than a 900 spectrum. It just gets
11	places where the 900 doesn't. Plus the 220 we can use because
12	of the bandwidth, we are able to use more frequency to get the
13	bandwidth and bring back information that's needed.
14	MR. ENGEL: Your Honor, the witness is available for
15	cross-examination.
16	JUDGE SIPPEL: Very well. Good morning, Mr. Pillar.
17	THE WITNESS: Good morning.
18	JUDGE SIPPEL: Some courtroom courtesies, when counsel
19	asks you to turn to Tab Echo, you're supposed to say, Roger that.
20	THE WITNESS: Sorry.
21	JUDGE SIPPEL: Okay. Now we have to get down to work.
22	THE WITNESS: Okay.
23	JUDGE SIPPEL: You're tendered for cross-examination by
24	counsel for Mr. Havens and the Havens companies.
25	MR. HAVENS: He's not my counsel.

1 JUDGE SIPPEL: Beg your pardon? 2 MR. HAVENS: I keep saying Mr. Stenger is not my counsel. 3 MR. STENGER: Good morning --4 JUDGE SIPPEL: You can say -- his name is -- he'll 5 introduce himself to you. 6 MR. STENGER: Good morning, Mr. Pillar. 7 JUDGE SIPPEL: Would you introduce yourself, Mr. Stenger? 8 MR. STENGER: We met in the hallway but, for the record, 9 James Stenger with Chadbourne & Parke for Environmental and Verde 10 Systems. 11 THE WITNESS: Good morning. 12 CROSS-EXAMINATION 13 BY MR. STENGER: 14 In your testimony, in your second paragraph there --15 What page? Oh, never mind. Sorry. Page 1. 16 17 Yes. Page 1, Paragraph 2, your third sentence begins "DCL's 18 19 operations are supported by and dependent on having a radio 20 communication system that allows" -- I'm just paraphrasing. 21 not going to read the whole sentence. It's a long sentence but 22 it's, having radio communications with municipalities, police, fire 23 JUDGE SIPPEL: You know what to do? Just have him --24 25 just point the sentence out to him. Have him read it to himself

and then ask if he understands the sentence. 1 MR. STENGER: I'll give you a moment to read that. 2 JUDGE SIPPEL: Read the sentence. 3 THE WITNESS: Okay. 4 5 JUDGE SIPPEL: Let us know when you're finished but take 6 your time. 7 THE WITNESS: Okay. I read it. 8 BY MR. STENGER: Did Duquesne use maritime spectrum for those types of 9 communications? 10 11 We use maritime spectrum for SCADA on distribution automation, which, if there's a full on a -- say we have a circuit. 12 We have devices that are on full pump that will, in effect, 13 localize the fault and we can back feed and keep the number of 14 customers without power at a minimum. 15 16 So, therefore, if there's a fault during a storm, we can have people back within three minutes. Instead of having 4,000 17 18 people out of power, we can basically have maybe a thousand people 19 without power. 20 Of the other functions that you list there --We would also like to use and, since we've had --21 22 No. I'm sorry. I don't mean to interrupt you. But I asked, did -- which of these did you actually use? 23 We used it for SCADA, the data communications we used it 24 25 for. We also intend on, if allowed, we intend to use it for

protection and control on our rural substations, which protection and control lets you know when your transformer is basically getting ready to do something bad in the breakers.

The spectrum -- we have tested radios and it works great with our protection and control relays. It works great with our new distribution automation. It would work great with our smart meter program, but they've elected to go with the 900 because of the ongoing disputes with the 220 spectrum that Maritime sold us.

- Q Don't most utilities use 900 for meter reading?
- A A lot of companies use wireless modems that go through

  Verizon or AT&T. It depends on their territory. A lot of people

  use 365. In our territory, they want to use 365 because of the

  bandwidth but, when you're at 1 watt, you're not going to reach out

  and touch much.

The 900 is better than the 365. It's -- but it's nowhere near the 220. It's all art of physics, the lower frequency. And the 220 gives you, you know, between the VHF and UHF range, it's the best of both worlds and it serves our purpose greatly.

- Q I'm sorry. I'm not sure what your answer was. In your knowledge as a engineer, do most utilities use 900?
  - A No, not most. But it depends on --
  - Q Well, wait a minute.
- A Each utility has a different -- like Houston, Texas has nowhere the terrain that we have in Pittsburgh. So, therefore, they can use the 900 a lot easier than we can use it.

+	So you're asking a question that the United States has
2	all the same kind of terrain, which is false. It depends on where
3	you are in the country. Some places, like in Oklahoma, 900's
4	awesome, so it 365. But, in Pittsburgh
5	Q What do you mean by 365? I'm sorry to interrupt.
6	A 3.65 gigahertz.
7	Q 3.65 gigahertz?
8	A Yes.
9	Q So that's way above 900?
10	A Yes, way above 900.
11	Q There's a book called EVH Admitted Exhibits. It's a
12	black binder and says "EVH Admitted Exhibits."
13	A It's right here. Yes.
14	Q And, if you could, just take a look at Exhibit 209.
15	A Okay.
16	JUDGE SIPPEL: Can you just explain for the record what
17	the document is?
18	MR. STENGER: Well
19	JUDGE SIPPEL: Go ahead ask the witness that.
20	BY MR. STENGER:
21	Q Mr. Pillar, is this a document you're familiar with as
22	being the Maritime Radio License, WHG750? Are you familiar with
23	this?
24	A I believe so. I mean I believe so. I've never seen the
25	document, itself.

1	Q Why don't you take a moment to look at it because I know
2	you testified about WHG750 and this is supposed to be a copy of it
3	from the FCC database? Why don't you take a moment to
4	A I never got and I never went on to get or I've never seen
5	
6	MR. ENGEL: Objection, Your Honor, the extent counsel
7	explained to the witness what something was.
8	JUDGE SIPPEL: Yes. We're trying to get him on this. I
9	don't know why you didn't ask him I tried and you interrupted
10	me.
11	MR. STENGER: I'm sorry, Your Honor.
12	JUDGE SIPPEL: I was trying to get the witness to explain
13	what he thinks the document is. He's never seen it before. You
14	want him to read the whole you want him to be comfortable with
15	the whole document or just one of the pages?
16	MR. STENGER: Just the first page, Your Honor, where it
17	identifies the location of the station.
18	BY MR. STENGER:
19	Q Do you see that?
20	A Yes. That Hookstown is one of our power sites,
21	communication-wise.
22	JUDGE SIPPEL: Have you ever seen one of these before?
23	THE WITNESS: Yes, a license.
24	JUDGE SIPPEL: Have you seen one before?
25	THE WITNESS: An FCC license, yes.

JUDGE SIPPEL: All right. If you're comfortable with it, 1 go ahead and you can answer the question. He did. He did. So 2 3 what's the next question? 4 BY MR. STENGER: 5 In your -- if you take a look at Paragraph 5 of your 6 testimony, you mention towers that you placed in operation. I just 7 -- my question is are any of those towers at these coordinates that 8 are listed on this license? I don't have my document to show me where my towers are 9 right at this time. I would believe so. 10 JUDGE SIPPEL: Paragraph 5 has Dravosburg Tower, Hopewell 11 12 Tower, et cetera. 13 THE WITNESS: Hookstown Tower. Yes. This one's Hookstown here. 14 15 JUDGE SIPPEL: Mount Washington Tower. 16 THE WITNESS: I would -- without looking at my sheet, I would say yes because that is -- I would say yes. I don't have my 17 18 documentation to say yes, this is exactly where my tower is. BY MR. STENGER: 19 20 Which one of these towers that you list in your Paragraph 21 That's the Hookstown. 22 23 -- 5. Shipping Port and Hookstown. Shipping Port Tower. 24 A 25 JUDGE SIPPEL: Now, how are you able to do that with this

1	document? What is this this is Exhibit 209. What does that
2	tell you?
3	THE WITNESS: Hookstown is what we call Shipping Port
4	Tower.
5	JUDGE SIPPEL: So you got the word "city" as Hookstown
6	right in here?
7	THE WITNESS: That's the only communications tower we
8	have in the area, the Shipping Port.
9	JUDGE SIPPEL: So that's all this document was for?
10	THE WITNESS: I can't look at the latitude and longitude
11	and say, yes, that's exactly where my tower is without looking at
12	my information I have at work.
13	JUDGE SIPPEL: I understand that. But assuming
14	THE WITNESS: But assuming from Hookstown City
15	JUDGE SIPPEL: That this is a viable document
16	THE WITNESS: Yes. I would say, yes.
17	JUDGE SIPPEL: this is probably it?
18	THE WITNESS: Yes.
19	JUDGE SIPPEL: As best we can get. That's okay. That's
20	fine.
21	THE WITNESS: I mean I don't want to say
22	JUDGE SIPPEL: No, no. Don't do anything more, just do
23	the best you can.
24	BY MR. STENGER:
25	Q Your at your locations where you have listed these

1	locations of your towers in Paragraph 5, again, of your testimony
2	
3	A Okay.
4	Q you testify have you posted or has a copy of this
5	license been posted at those locations?
6	MR. KIRK: Objection. Relevance.
7	JUDGE SIPPEL: Sustained.
8	BY MR. STENGER:
9	Q You know you're required to post your FCC License at the
LO	<del></del> 1
1	JUDGE SIPPEL: That's not an issue in this case. Move
L2	on.
L3	MR. STENGER: Well, Your Honor, he said that he's never
L4	seen the license before and the rules require him to post
L5	JUDGE SIPPEL: Move on. Move on.
L6	BY MR. STENGER:
L7	Q Are these five well, let me see. How many is it? How
18	many of these towers are there?
L9	A On the 220 spectrum?
20	Q Yes.
21	A There's ten I believe.
22	Q Are they fill-in locations?
23	A What do you mean by fill-in?
24	MR. ENGEL: Objection, Your Honor. I think he's going to
25	ask the witness to testify about what he knows, but I don't think

we should be educating the witness on the stand. So I just --1 2 JUDGE SIPPEL: Well, he's asking a question. 3 MR. ENGEL: I understand the witness didn't understand 4 the question but I think the response -- I think I'd like to -- I think the witness asked a question of Mr. Stenger --5 6 JUDGE SIPPEL: Yes, he did. 7 MR. ENGEL: -- for a legal explanation. I don't think we 8 should give that. I think we're here to testify. The witness is 9 here to testify about his firsthand knowledge. 10 JUDGE SIPPEL: I'll instruct the witness. Mr. Pillar, in 11 your answer, you just state what you know, take the answer to the 12 question that you have or that you don't know or whatever it is. 13 But don't turn around and ask counsel a question because that's -that's like looking into the barrel of howitzer. You don't want to 14 15 do that. With a lawyer, you don't want to do that. 16 THE WITNESS: Yes, I don't want to do that. 17 JUDGE SIPPEL: Okay, sir. 18 THE WITNESS: I don't understand your question. 19 BY MR. STENGER: 20 Well, let me ask you a different question. How did you determine what locations you were allowed to place towers and use 21 22 Maritime's spectrum and what locations would be outside the area 23 where you could use Maritime's spectrum? How did you make that determination? 24 25 I believe that we came up with that because the spectrum

covers Beaver and Allegheny County. And Maritime gave us special
-- there was two towers that were close to -- specifically, one
tower that was close to the county border. And we had to use a
special antenna so as to prevent propagation into another county.

From what I understand, the 220 you could use basically wherever you wanted to in those two counties, as long as it didn't propagate into other counties. That's the best of my knowledge. Those are the -- those places is where -- are where we have communications towers that were -- that have poor communications with Verizon, who we use modems with. And that's how we came up with those towers.

- Q I was trying to pay attention to everything. But I think you mentioned two counties that I didn't catch.
- A Beaver County and Allegheny County. Parts of Beaver and Allegheny Counties are Duquesne Light territories. That's it.

  We're a small electric company.
- Q And Beaver and Allegheny County. And did you say that your understanding is that the Maritime Spectrum covered those two counties?
- A I believe so. I submitted to Maritime where we would like to use the spectrum, I believe. I mean this has been a long time ago. But I believe that I gave him the sites we would like to use and he came back with the frequencies.
  - Q Who is the he that you're referring to?
  - A Maritime, Mr. Rendon or -- I can't pronounce --

1	Q Reardon?
2	A Reardon was it was for Maritime. I know that for
3	sure.
4	Q Did he when you said he came back and gave it to you,
5	did he give this to you in a written document or just on the phone
6	or
7	A I believe so. I believe so. In an email, I believe. I
8	believe it was given to the Court a long time ago.
9	Q In the email, did it have a chart attached to it or
10	A I can't
11	Q it just said "county"?
12	A It's been so long I can't give you that information. I
13	don't know.
14	Q And did you do any investigation of your own as to what
15	the contours of the Maritime Spectrum are, or you just relied on
16	that email?
17	A He was telling us the spectrum. He would know the
18	what could go where. I did propagation studies, if that's what
19	you're asking. But, as far as did I do a legal research, I left
20	that to our legal department. I'm not an attorney, so I can't tell
21	you.
22	Did I from what I understood from law previously on
23	the 220 spectrum is what they said was true. I had no reason to
24	go ahead.
25	JUDGE SIPPEL: Okay. You're you found your answer.

1	MR. STENGER: I'm going to go back to a
2	JUDGE SIPPEL: What is a propagation study?
3	THE WITNESS: It tells you where what you think
4	you put into the computer the type of antenna, the frequency, the
5	power that you're using and it'll show you where it's going to hit.
6	It's about 90 percent
7	JUDGE SIPPEL: Where it's most efficient
8	THE WITNESS: Yes.
9	JUDGE SIPPEL: location would be?
10	THE WITNESS: Yes.
11	BY MR. STENGER:
12	Q You did propagation studies for your towers?
13	A Yes, on our towers.
14	Q You're not saying you did any studies of the Maritime's
15	<del></del>
16	A No. I used Maritime's frequencies and I put them on
17	our towers and I did propagation studies.
18	Q Of your towers?
19	A Of our towers, communication towers.
20	Q Now, who prepared your statement?
21	A I did with the help of legal counsel from Duquesne
22	Light.
23	Q Who was that?
24	A Leslie Gannon.
25	Q And did you work with any other lawyers in preparing

1	the statement and did you work with anybody else in preparing the
2	statement?
3	A I believe I did outside counsel, who Duquesne Light
4	hired.
5	Q And who do you report to at Duquesne?
6	A Chip Grubbs.
7	Q What is his title?
8	A Supervisor of Field Operations.
9	Q So you're Senior Communications Engineer and you're
10	underneath of the Field Operations?
11	A Supervisor.
12	Q And then who does he report to?
13	A Mark Sprock. He's the Manager of Communications.
14	Q And is there somebody higher above him
15	MR. ENGEL: Objection, Your Honor.
16	MR. KIRK: This isn't discovery here.
17	MR. STENGER: I'm just trying to find out
18	JUDGE SIPPEL: Sustained.
19	MR. STENGER: how high up in the chain
20	JUDGE SIPPEL: Sustained. Next question.
21	MR. STENGER: Was there a reason why they picked you to
22	give the statement rather than one of these other guys?
23	MR. ENGEL: Objection, Your Honor.
24	JUDGE SIPPEL: Sustained.
25	MR. STENGER: Why were you selected to prepare this

1	statement and testify, rather than one of your supervisors?
2	MR. ENGEL: Objection, Your Honor.
3	JUDGE SIPPEL: Sustained.
4	MR. STENGER: I don't have any more questions for the
5	witness, Your Honor. Mr. Havens has some technical questions he
6	wants asked, if you'll permit it.
7	JUDGE SIPPEL: How many you got, Mr. Havens? You
8	technically should have a number. How many questions do you have,
9	sir? Can you hear me? Can you hear me okay?
10	MR. HAVENS: I can hear you.
11	JUDGE SIPPEL: Because you keep cupping your ear.
12	MR. HAVENS: I can't hear you that well. I do have a
13	bit of an ear problem.
14	JUDGE SIPPEL: Do you want to come up here?
15	MR. HAVENS: It was a little muddled but I heard you.
16	JUDGE SIPPEL: Do you want to come up here?
17	MR. HAVENS: No. I heard you. I'm
18	JUDGE SIPPEL: All right.
19	MR. HAVENS: I'm trying to answer your question.
20	JUDGE SIPPEL: I want to be sure we're not missing any
21	communication here. Okay. How many questions do you have?
22	MR. HAVENS: Like I said the other day, I'd like to ask
23	questions. Depending on the answer, I may have additional
24	questions. But, if you're going to limit me to a specific number
25	A.S.

1	JUDGE SIPPEL: Well, how many do you go ahead. Go
2	ahead.
3	MR. HAVENS: Well, I'm
4	JUDGE SIPPEL: Just tell me. Give me a number, without
5	subparts.
6	MR. HAVENS: Well, the way it works, Your Honor,
7	technical matters have subparts. So you have to
8	JUDGE SIPPEL: I'm accepting that. I'm accepting that.
9	Tell me how many questions you have.
10	MR. HAVENS: You mean the main questions?
11	JUDGE SIPPEL: You're starting out with something in
12	your mind that you intend to ask questions. How many do you have?
13	How many questions do you have?
14	MR. HAVENS: The answer
15	JUDGE SIPPEL: We can talk later as you get
16	MR. HAVENS: The question I just asked you is do you
17	mean the principal questions or
18	JUDGE SIPPEL: Yes.
19	MR. HAVENS: including the subparts?
20	JUDGE SIPPEL: No, just take the principal questions:
21	five/four?
22	MR. HAVENS: It looks like four or five.
23	JUDGE SIPPEL: Thank you. Start with your first one.
24	BY MR. HAVENS:
25	Q Mr. Pillar, is that correct?

1	A Yes.
2	Q Do you have a background in wireless communications
3	engineering? If I missed it, I apologize.
4	A I did communications on aircraft for 20-some years.
5	Q That's wireless regular?
6	A Radio communications. Yes. You can't wire it and fly.
7	Q All right. Thank you. So, you that applies to
8	in the FCC License field. Then do you know the FCC technical rules
9	for AMTS radio communications?
10	A Off by heart, no, I don't.
11	Q I don't mean by heart.
12	A I have a book that I can look and I check in.
13	Q And do you look at the book and check in the book for
14	the technical
15	A Lately? No, I haven't because most of our stuff is up
16	and running already.
17	Q No, I didn't I wasn't finished with the question.
18	A I'm sorry.
19	Q When you take actions in your responsibility with your
20	company to plan and operate radio stations using the Maritime
21	spectrum at different locations with various power levels, with
22	service contours you understand you're complying with
23	A Yes.
24	Q power levels, et cetera
25	A Yes.
- 1	

1	Q is there a technical
2	JUDGE SIPPEL: Mr. Havens, you're posing a hypothetical
3	to him. Ask him if he accepts your hypothetical. All these little
4	pieces you're putting in there, does he agree with that?
5	MR. HAVENS: Okay. Let me restate the question then.
6	BY MR. HAVENS:
7	Q The FCC has technical rules and you have said you have
8	a book and you're aware of the rules. When you take your actions,
9	when you take actions with the Maritime spectrum, do you reference
10	the rules? And can you explain at all today, if I asked you some
11	subquestions, how your operations are consistent with these rules?
12	MR. ENGEL: Objection. Compound question.
13	JUDGE SIPPEL: No. That's okay. I think he can handle
14	it. Can you handle that question?
15	THE WITNESS: Yes. Yes.
16	BY MR. HAVENS:
17	Q Okay. So to break it down then, do you know whether or
18	not the FCC has a rule for determining a permitted technical
19	service contour for AMTS, an AMTS site-based station? Do you know
20	of such a rule?
21	A Not right offhand. No.
22	Q Well, I didn't mean
23	A If
24	JUDGE SIPPEL: No. Let me explain to you. You are not
25	being tested on your knowledge of the rules.

1	THE WITNESS: Okay.
2	JUDGE SIPPEL: He's trying to give you a frame of
3	reference.
4	THE WITNESS: Okay.
5	JUDGE SIPPEL: So maybe could you be more specific with
6	the rule that you're talking about, paraphrase what it is that the
7	rule is designed to do? Can you do that?
8	MR. HAVENS: There is there are a series of FCC
9	rules that define the radio spectrum range and the
10	JUDGE SIPPEL: Does he agree with that?
11	MR. HAVENS: Excuse me?
12	JUDGE SIPPEL: Ask him if he agrees with that.
13	BY MR. HAVENS:
14	Q Do you agree with that?
15	A Sure. Yes.
16	Q Okay. But, am I correct, you don't know those sitting
17	here today?
18	A I don't have a book in I don't have my book in front
19	of me. I'm sorry. We bought the spectrum a long time ago.
20	Q I'm just asking you questions. I'm not saying there's
21	anything wrong with that answer.
22	A Do I know how we got the output of power? Yes.
23	Q Okay.
24	JUDGE SIPPEL: Again, you're not being tested on your
25	knowledge of the rule, your memory, or anything like that.

E

BY MR. HAVENS:

Q But, when you planned your stations that were in accord with what Maritime told you you could do, did you do anything yourself to verify that where you placed your statements were within the permitted service contour in accordance with the FCC rule on determining a permitted service contour for AMTS?

A Duquesne Light worked with a company that we purchased our radios with. They did some engineering for us, also, and they agree with the findings that I came up with.

- Q What findings did you come up with?
- A That it was within the tolerances of --
- 0 What tolerances?
- A -- the FCC.

JUDGE SIPPEL: Wait a minute. Don't rush him. Don't rush him.

THE WITNESS: You're asking me if I worked alone. No. I worked with an engineering firm that represented the radios that we purchased. They agreed that we were within FCC rules in operating of these sites and these powers that we use and the antennas, that we would not be overpowering or nowhere near the power output at the top of the antenna, with the gain in the antenna and output of the power of the radio.

We're within tolerance and the antennas that we use for on the edge of the counties they have no problem with either using those. Actually, they were --

1	Q Now, were you
2	JUDGE SIPPEL: Go ahead and let him finish. Go on,
3	sir?
4	THE WITNESS: The engineering firm the one antenna
5	we used on the side of the county recommended that antenna. So
6	BY MR. HAVENS:
7	Q What was the engineering company? Who was it?
8	A I can't remember. It was with the radio group. I
9	can't give you that information. I don't have it in front of me.
10	Q As an expert or qualified person in radio
11	communications, am I correct that you didn't personally, although
12	you had the books of the rules
13	A I said
14	(Simultaneous speaking)
15	JUDGE SIPPEL: Wait a minute.
16	THE WITNESS: If you had listened to me earlier, I said that
17	I did them and they agreed with my findings and I agree with
18	theirs.
19	JUDGE SIPPEL: Right. You referred to him as an expert
20	and he's not an expert.
21	MR. HAVENS: No. I said an expert or a qualified
22	person.
23	JUDGE SIPPEL: And that did not apply to Mr. Pillar.
24	MR. HAVENS: No. I took it that his testimony the
25	first thing I asked him, do you have background in wireless

1	engineering, and he said, yes.
2	THE WITNESS: No. You said wireless communications. You
3	didn't say engineering.
4	MR. HAVENS: All right. Wireless communications.
5	THE WITNESS: Well, there's a difference.
6	JUDGE SIPPEL: He said there's a difference.
7	MR. HAVENS: He did?
8	JUDGE SIPPEL: He said there's a difference.
9	BY MR. HAVENS:
10	Q What is the difference?
11	A I don't design wireless communications equipment. I
12	know what our needs are. I go out and find what fits our needs and
13	we try to make it work.
14	Q I don't understand. What technical ability do you have
15	if it's not an engineering ability?
16	A I don't design the actual radios. I know how to use
17	them.
18	Q I'm not talking about
19	JUDGE SIPPEL: He hasn't finished his answer.
20	THE WITNESS: I know how to use them in the field, use
21	them in propagation studies to do it the best we can, to make it
22	work for Duquesne Light.
23	MR. HAVENS: Okay. What I don't
24	THE WITNESS: If you want to call that
25	MR. HAVENS: The whole line of my questions
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JUDGE SIPPEL: Okay. You're doing fine. I was just 2 telling the witness he's okay. You're kind of upsetting him. 3 MR. HAVENS: I'll go slower or whatever you'd like. I don't mean to be upsetting the witness. 4 JUDGE SIPPEL: He's fine. But go ahead. 5 MR. HAVENS: Well, then tell me what to do. 6 7 JUDGE SIPPEL: Take the next question. Just take the next question. 8 MR. KIRK: I'd like to object, Your Honor, to the line 9 of questioning. It's gone beyond the scope of the testimony. It's 10 11 getting into sort of technical background, whereas the testimony's 12 focused on the needs of the company. JUDGE SIPPEL: Well, I appreciate that, Mr. Kirk. When 13 he stood up he gave notice that he was going to ask some technical 14 15 questions. And as long as the witness is able to handle them and he doesn't get worn out by the process, I'm interested in hearing 16 it. But it only can go so far. So do you have much more, Mr. 17 18 Havens? MR. HAVENS: Not much more. 19 JUDGE SIPPEL: Thank you, sir. 20 21 MR. HAVENS: Well, I do have a lot more but I'm going off your -- I'm complying with your limitations. 22 23 JUDGE SIPPEL: Yes. That's what I mean by much more. MR. HAVENS: Okay. 24 25 JUDGE SIPPEL: That's fine.